



Commonwealth of Virginia

VIRGINIA DEPARTMENT OF ENVIRONMENTAL QUALITY

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Matthew J. Strickler
Secretary of Natural Resources

David K. Paylor
Director
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Amy Thatcher Owens
Regional Director

January 23, 2019

Ms. Amity Moler
County Administrator
County of Page
103 South Court Street
Luray, Virginia 22835
via email: amoler@pagecounty.virginia.gov

Facility: Battle Creek Landfill
Location: Page County
Registration No.: 81380
Plant ID No.: 51-139-0031

Dear Ms. Moler:

Attached is a renewal Title V permit to operate your facility pursuant to 9 VAC 5 Chapter 80 Article 1 of the Virginia Regulations for the Control and Abatement of Air Pollution. This permit incorporates provisions from the permit dated April 23, 2001, as amended November 20, 2006 and December 29, 2015.

In the course of evaluating the application and arriving at a final decision to issue this permit, the Department of Environmental Quality (DEQ) deemed the application complete on December 16, 2016 and solicited written public comments by placing a newspaper advertisement in the *Page News & Courier* on November 1, 2018. The thirty-day required comment period, provided for in 9 VAC 5-80-270 expired on December 3, 2018.

The permit contains legally enforceable conditions. Failure to comply may result in a Notice of Violation and/or civil charges. Please read all permit conditions carefully.

This permit approval to operate shall not relieve County of Page of the responsibility to comply with all other local, state, and federal permit regulations.

To review any federal rules referenced in the attached permit, please refer to the website on which the US Government Publishing Office maintains the text of these rules: www.ecfr.gov, Title 40, Part 70.

The Board's Regulations as contained in Title 9 of the Virginia Administrative Code 5-170-200 provide that you may request a formal hearing from this case decision by filing a petition with the Board within 30 days after this case decision notice was mailed or delivered to you. Please consult the relevant regulations for additional requirements for such requests.

As provided by Rule 2A:2 of the Supreme Court of Virginia, you have 30 days from the date you actually received this permit or the date on which it was mailed to you, whichever occurred first, within which to initiate an appeal of this decision by filing a Notice of Appeal with:

David K. Paylor, Director
Department of Environmental Quality
P. O. Box 1105
Richmond, VA 23218

If this permit was delivered to you by mail, three days are added to the thirty-day period in which to file an appeal. Please refer to Part Two A of the Rules of the Supreme Court of Virginia for information on the required content of the Notice of Appeal and for additional requirements governing appeals from decisions of administrative agencies.

If you have any questions concerning this permit, please contact Cassandra J. Frysinger at Cassandra.Frysinger@deq.virginia.gov or (540) 574-7863.

Sincerely,

A handwritten signature in dark ink, reading "Janardan R. Pandey", with a horizontal line underneath.

Janardan R. Pandey, P.E.
Air Permit Manager

Attachment: Permit

ec: David Taylor, DEQ Air Inspector
Jeff Blevins, Page County Solid Waste Operations Manager
Director, OAPP
Chief, Air Enforcement Branch (3AP20), U.S. EPA, Region III
File DEQ-VRO



COMMONWEALTH of VIRGINIA

DEPARTMENT OF ENVIRONMENTAL QUALITY

Federal Operating Permit Article 1

This permit is based upon the requirements of Title V of the Federal Clean Air Act and Chapter 80, Article 1 of the Commonwealth of Virginia Regulations for the Control and Abatement of Air Pollution. Until such time as this permit is reopened and revised, modified, revoked, terminated or expires, the permittee is authorized to operate in accordance with the terms and conditions contained herein. This permit is issued under the authority of Title 10.1, Chapter 13, §10.1-1322 of the Air Pollution Control Law of Virginia. This permit is issued consistent with the Administrative Process Act, and 9 VAC 5-80-50 through 9 VAC 5-80-300 of the State Air Pollution Control Board Regulations for the Control and Abatement of Air Pollution of the Commonwealth of Virginia.

Authorization to operate a Stationary Source of Air Pollution as described in this permit is hereby granted to:

Permittee Name:	County of Page, Department of Public Works
Facility Name:	Battle Creek Landfill
Facility Location:	219 Landfill Drive Luray, Virginia 22835
Registration Number:	81380
Permit Number:	VRO81380

This permit includes the following programs:

Federally Enforceable Requirements – Clean Air Act

February 1, 2019

Effective Date

January 31, 2024

Expiration Date

A handwritten signature in blue ink, appearing to read "BK Jull", written over a horizontal line.

Deputy Regional Director

January 22, 2019

Signature Date

Permit Conditions 1 to 59; 22 pages.
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Facility Information

Permittee

County of Page
103 South Court Street
Luray, Virginia 22835

Responsible Official

Ms. Amity Moler
County Administrator

Facility

Battle Creek Landfill
219 Landfill Drive
Luray, Virginia 22835

Contact Person

Mr. Jeff Blevins
Solid Waste Operations Manager
(540) 743-3854
jblevins@pagecounty.virginia.gov

County-Plant Identification Number: 51-139-0031

Facility Description: NAICS Code 562212 – Refuse Systems

Battle Creek Landfill is a municipal solid waste (MSW) management facility located in Page County, Virginia with a maximum design capacity of 6.094 million cubic meters, equivalent to 4.556 million megagrams. A minor New Source Review (NSR) permit amendment was completed on December 29, 2015 that increased the maximum design capacity from 2.769 million megagrams, as listed in the previous Title V permit. Battle Creek Landfill is classified as a minor source for all pollutants and is located in an attainment area for all pollutants.

The permitted design capacity of the Battle Creek Landfill is greater than 2.5 million m³ and 2.5 million megagrams. Therefore, the landfill is regulated according to New Source Performance Standards (NSPS) Subpart WWW. As stated in 40 CFR 60.752 (b), landfills above the 2.5 million m³ and 2.5 million megagrams design capacity are subject to Title V permitting requirements. Additionally, since the landfill was modified after July 17, 2014, it is also regulated according to 40 CFR 60 Subpart XXX (Standards of Performance for Municipal Solid Waste Landfills that Commenced Construction, Reconstruction or Modification after July 17, 2014). The facility is currently permitted under a minor NSR permit dated April 23, 2001, as amended November 20, 2006 and December 29, 2015.

Emission Units

Equipment to be operated consists of:

Emission Unit ID	Stack ID	Emission Unit Description	Size/Rated Capacity*	Pollution Control Device Description (PCD)	PCD ID	Pollutant Controlled	Applicable Permit Date
Landfill							
EU-1	-	MSW Landfill	4.556 million Mg	-	-	-	04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015

*The Size/Rated capacity is provided for informational purposes only, and is not an applicable requirement.

Landfill Requirements – (Emission Unit EU-1)

1. **Limitation (EU-1)** – The landfill shall not accept more than 4.556 million megagrams of municipal solid waste for disposal in the landfill. An increase in the amount of waste accepted may require a new or amended permit.
(9 VAC 5-80-110 and Condition 1 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)
2. **Limitation (EU-1)** – The permittee shall install and start up a landfill gas (LFG) collection and control system that captures the gas generated within the landfill as required by 40 CFR §60.762 (b)(2)(ii)(A) or (B) and 40 CFR §60.762 (b)(2)(iii) within 30 months after the first annual non-methane organic compounds (NMOC) emission rate report, required in Condition 13, in which the NMOC emission rate equals or exceeds 34 megagrams per year, unless Tier 2 or Tier 3 sampling demonstrates that the NMOC emission rate is less than 34 megagrams per year or Tier 4 monitoring, as described in Condition 11, demonstrates that surface methane emissions are below 500 parts per million.
(9 VAC 5-80-110, 40 CFR 60.752 (b), 40 CFR 60.762 (b) and Condition 2 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)
3. **Limitation (EU-1)** – Any LFG collection and control system used to comply with 40 CFR 60.762(b)(2) and Condition 2 shall be operated in accordance with 40 CFR 60.763.
(9 VAC 5-80-110, 40 CFR 60.753 and 40 CFR 60.763)
4. **Limitation (EU-1)** – If the permittee is required to install a gas collection and control system according to the provisions of NSPS, Subpart XXX, the permittee shall apply for a solid waste permit amendment in accordance with Part VII (9 VAC 20-80-480 et seq.) of 9 VAC 20 Chapter 80 (Solid Waste Management Regulations).
(9 VAC 5-80-110 and Condition 17 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)
5. **Limitation (EU-1)** – If the permittee is required to install a gas collection and control system according to the provisions of NSPS, Subpart XXX, the permittee shall apply for a Title V operating permit administrative amendment within 90 days of the date of approval of the gas collection and control plan.
(9 VAC 5-80-110 and Condition 18 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)
6. **Monitoring and Recordkeeping (EU-1)** – The permittee shall use either of the following equations (Equation 1 or Equation 2) to calculate the annual NMOC emission rate. The default values to be used in both equations are 0.05 per year for k, 170 cubic meters per megagram for L_0 , and 4000 parts per million by volume as hexane for C_{NMOC} . If obtained, the site-specific value for C_{NMOC} , as determined by using the procedure specified in Condition 8, and/or the site-specific value for k, as determined by using the procedure specified in Condition 9, shall be used in lieu of the default value for C_{NMOC} and/or k in calculating the NMOC emission rate.

- a. Equation 1 shall be used if the actual year-to-year solid waste acceptance rate is known:

$$M_{NMOC} = \sum_{i=1}^n 2kL_oM_i(e^{-kt_i})(C_{NMOC})(3.6 \times 10^{-9})$$

.....Equation 1

M_{NMOC} = total NMOC emission rate from the landfill, megagrams per year
 k = methane generation rate constant, year⁻¹
 L_o = methane generation potential, cubic meters per megagram solid waste
 M_i = mass of solid waste in the i^{th} section, megagrams
 t_i = age of the i^{th} section, years
 C_{NMOC} = concentration of NMOC, parts per million by volume as hexane
 3.6×10^{-9} = conversion factor

The mass of nondegradable solid waste may be subtracted from the total mass of solid waste in a particular section of the landfill when calculating the value for M_i if documentation of the nature and amount of such wastes is maintained.

- b. Equation 2 shall be used if the actual year-to-year solid waste acceptance rate is unknown:

$$M_{NMOC} = 2L_oR(e^{-kc} - e^{-kt})(C_{NMOC})(3.6 \times 10^{-9})$$

.....Equation 2

M_{NMOC} = mass emission rate of NMOC from the landfill, megagrams per year
 L_o = methane generation potential, cubic meters per megagram solid waste
 R = average annual acceptance rate, megagrams per year
 k = methane generation rate constant, year⁻¹
 t = age of the landfill, years
 C_{NMOC} = concentration of NMOC, parts per million by volume as hexane
 c = time since closure, years (for an active landfill $c = 0$ and $e^{-kc} = 1$)
 3.6×10^{-9} = conversion factor

The mass of nondegradable solid waste may be subtracted from the average annual acceptance rate when calculating a value for R , if documentation of the nature and amount of such wastes is maintained.

(9 VAC 5-80-110, 40 CFR 60.754 (a)(1), 40 CFR 60.764 (a)(1), and Condition 5 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)

7. **Monitoring and Recordkeeping (EU-1)** – The permittee shall maintain records of all emission data and operating parameters necessary to demonstrate compliance with this permit. The content of and format of such records shall be arranged with the DEQ. These records shall include, but are not limited to:
- a. Readily accessible, on-site records of the landfill capacity.
 - b. Annual calculated mass emission rate of NMOC from the landfill.

- c. The current amount of solid waste in-place.
- d. The year-by-year or average waste acceptance rate.
- e. Site-specific values for C_{NMOC} and k , if obtained.
- f. Age of landfill.
- g. Description, location, amount, and placement date of all nondegradable refuse including asbestos and demolition refuse placed in landfill areas, which are excluded from landfill gas estimation.
- h. Installation date and location of all vents and/or gas collection components.
- i. For Tier 4 monitoring, to demonstrate site-specific surface methane emissions are below 500 ppm, the permittee shall keep records according to 40 CFR 60.768 (g) as applicable.
- j. If employing a leachate recirculation or liquids addition as specified under Condition 18, the permittee shall keep records of any engineering calculations or company records used to estimate the quantities of leachate or liquids added, the surface areas for which the leachate or liquids were applied, and the estimates of annual waste acceptance or total waste in place in the areas where leachate or liquids were applied.
- k. Those required by 40 CFR 60.768 for gas collection and control systems (if a gas collection and control system is required to be installed according to Condition 2).

These records shall be available for inspection by the DEQ and shall be current for the most recent five years. Off-site records may be maintained if they are retrievable within four hours. Either paper copy or electronic formats are acceptable.

(9 VAC 5-80-110, 40 CFR 60.758, 40 CFR 60.768, and Condition 12 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)

8. **Testing (EU-1)** – When determining the Tier 2 site-specific NMOC concentration, the permittee shall install at least two sample probes per hectare of landfill surface that has retained waste for at least two years. If the landfill is larger than 25 hectares in area, only 50 samples are required. The probes should be evenly distributed across the sample area. The sample probes should be located to avoid known areas of nondegradable solid waste. The permittee shall collect and analyze one sample of landfill gas from each probe to determine the NMOC concentration using 40 CFR 60, Appendix A, Method 25 or 25C. Taking composite samples from different probes into a single cylinder is allowed; however, equal sample volumes must be taken from each probe. For each composite, the sampling rate, collection times, beginning and ending cylinder vacuums, or alternative volume measurements must be recorded to verify that composite volumes are equal. Composite sample volumes should not be less than one liter unless evidence can be provided to substantiate the accuracy of smaller volumes. Terminate compositing before the cylinder approaches ambient pressure where measurement accuracy diminishes. If more than the required number of samples are taken, all samples shall be used in the analysis. The permittee shall divide the NMOC concentration from 40 CFR 60, Appendix A, Method 25 or 25C by six to convert from C_{NMOC} as carbon to C_{NMOC} as hexane. If the landfill has an active

or passive gas removal system in place, Method 25 or 25C samples may be collected from these systems instead of surface probes provided the removal system can be shown to provide sampling as representative as the two sampling probe per hectare requirement. For active collection systems, samples may be collected from the common header pipe. The sample location on the common header pipe must be before any gas moving, condensate removal, or treatment system equipment. For active collection systems, a minimum of three samples must be collected from the header pipe. The permittee shall submit a test protocol at least 30 days prior to testing. One copy of the test results shall be submitted to the DEQ within 45 days after test completion.

(9 VAC 5-80-110, 40 CFR 60.754 (a)(3), 40 CFR 60.764 (a)(3) and Condition 8 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)

9. **Testing (EU-1)** – The Tier 3 site-specific methane generation rate constant (k) shall be determined using the procedures provided in 40 CFR Part 60, Appendix A, Method 2E. The permittee shall estimate the NMOC mass emission rate using Equation 1 or Equation 2 in Condition 6.a or 6.b and using a site-specific methane generation rate constant, and the site-specific NMOC concentration as determined in Condition 8 instead of the default values provided in Condition 6. The permittee shall compare the resulting NMOC mass emission rate to the standard 34 megagrams per year. The permittee shall submit a test protocol at least 30 days prior to testing. One copy of the test results shall be submitted to the DEQ within 45 days after test completion.
(9 VAC 5-80-110, 40 CFR 60.754 (a)(4), 40 CFR 60.764 (a)(4), and Condition 9 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)
10. **Testing (EU-1)** – The permittee may use other methods to determine the NMOC concentration or a site-specific methane generation rate constant (k) as an alternative to the methods required in Conditions 8 and 9 if the method has been approved by the EPA.
(9 VAC 5-80-110, 40 CFR 60.754 (a)(5), 40 CFR 60.764 (a)(5) and Condition 10 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)
11. **Testing (EU-1)** – The permittee may conduct Tier 4 monitoring provided that the permittee can demonstrate that NMOC emissions are greater than or equal to 34 Mg/year but less than 50 Mg/year using Tier 1 or Tier 2.
(9 VAC 5-80-110 and 40 CFR 60.764 (a)(6))
12. **Testing (EU-1)** – If testing is conducted in addition to the monitoring specified in the permit, the permittee shall use the appropriate method(s) in accordance with procedures approved by the DEQ.
(9 VAC 5-80-110)
13. **Reporting (EU-1)** – Not later than April 15 of each year, the permittee must submit an annual NMOC emission rate report to the DEQ. The NMOC emission rate shall be calculated in accordance with the methodology contained in Condition 6. The report shall include all data, calculations, sample reports and measurements used to estimate the emissions. If the estimated NMOC emission rate as reported in the annual report is less than 34 megagrams per year in each of the next five consecutive years, the permittee may elect to submit an estimate of the NMOC emission rate for the next five-year period in lieu of the annual report. This estimate shall include the current amount of solid waste-in-place and the

estimated waste acceptance rate for each year of the five years for which an NMOC emission rate is estimated. This estimate shall be revised at least once every five years. If the actual waste acceptance rate exceeds the estimated waste acceptance rate in any year reported in the five-year estimate, a revised five-year estimate shall be submitted. The revised estimate shall cover the five-year period beginning with the year in which the actual waste acceptance rate exceeded the estimated waste acceptance rate.

(9 VAC 5-80-110, 40 CFR 60.752(b)(1), 40 CFR 60.757 (b), 40 CFR 60.762(b)(1), 40 CFR 60.764 (a)(2), 40 CFR 60.767 (b), and Condition 13 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)

14. Reporting (EU-1) – If the reported NMOC emission rate in the annual report is equal to or exceeds 34 megagrams per year, the permittee shall:

- a. Submit a LFG collection and control system design plan as per 40 CFR 60.762 (b)(2); or
- b. Within 180 days of the emission rate report in Condition 13, demonstrate, using a site-specific NMOC concentration (Tier 2), that NMOC emissions do not equal or exceed 34 megagrams per year, submit a revised NMOC emission rate report, resume annual NMOC emission rate reporting, and retest the site-specific NMOC concentration every five years.

(9 VAC 5-80-110, 40 CFR 60.752 (b)(2), 40 CFR 60.757 (c)(1), 40 CFR 60.762 (b)(2), 40 CFR 60.764 (a), 40 CFR 60.767 (c)(4)(i), and Condition 14 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)

15. Reporting (EU-1) – If, using a site-specific NMOC concentration, the NMOC emission rate is equal to or exceeds 34 megagrams per year, the permittee shall:

- a. Submit a LFG collection and control system design plan as per 40 CFR 60.762 (b)(2); or
- b. Within one year of the emission rate report in Condition 13, demonstrate using a site-specific methane generation constant (Tier 3), that NMOC emissions do not equal or exceed 34 megagrams per year, submit a revised NMOC emission rate report and resume annual NMOC emission rate reporting.

(9 VAC 5-80-110, 40 CFR 60.752 (b)(2), 40 CFR 60.757 (c)(2), 40 CFR 60.762 (b)(2), 40 CFR 60.764 (a), 40 CFR 60.767 (c)(4)(ii), and Condition 15 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)

16. Reporting (EU-1) - If the NMOC mass emission rate as calculated using the Tier 2 site-specific NMOC concentration and Tier 3 site-specific methane generation rate is equal to or greater than 34 megagrams per year, the permittee shall:

- a. Submit a gas collection and control system design plan within 1 year as specified in 40 CFR 60.767(c) and install and operate a gas collection and control system within 30 months according to 40 CFR 60.762(b)(2)(ii) and (iii); or

- b. Conduct a surface emission monitoring demonstration using the Tier 4 procedures as specified in Condition 11.

(9 VAC 5-80-110, 40 CFR 60.764 (a)(4)(i))

17. **Reporting (EU-1)** – If the permittee elects to conduct Tier 4 monitoring, the Tier 4 reports shall be submitted according to the requirements of 40 CFR 60.767 (c)(4)(iii).
(9 VAC 5-80-110 and 40 CFR 60.767 (c)(4)(iii))

18. **Reporting (EU-1)** – If the permittee has employed a leachate recirculation system or used added liquids based on a Research, Development, and Demonstration permit within the last 10 years, reports shall be submitted according to the requirements of 40 CFR 60.767 (k).
(9 VAC 5-80-110 and 40 CFR 60.767 (k))

19. **Reporting (EU-1)** – The permittee shall provide a notification of the date(s) upon which it intends to demonstrate site-specific surface methane emissions are below 500 parts per million methane, based on the Tier 4 provisions of 40 CFR 60.764(a)(6). The permittee must also include a description of the wind barrier to be used during the surface emissions monitoring in the notification. Notification must be postmarked not less than 30 days prior to such date.
(9 VAC 5-80-110 and 40 CFR 60.767(l)(1))

20. **Reporting (EU-1)** – The LFG collection and control system design plan required by Conditions 14, 15, or 16 shall be prepared by a professional engineer and submitted to the DEQ:
- a. within one year after submitting the NMOC emission rate report, required by Condition 13, which reports an NMOC emission rate equal to or exceeding 34 megagrams per year; or
 - b. within one year of the first measured exceedance of 500 ppm methane.

(9 VAC 5-80-110, 40 CFR 60.752 (b)(2)(i), 40 CFR 60.762 (b)(2)(i) and Condition 16 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)

21. **Reporting** – The permittee shall submit a closure report to the DEQ, within 30 days of the date the MSW landfill stopped accepting waste.
(9 VAC 5-80-110, 40 CFR 60.757 (d), 40 CFR 60.767 (e) and Condition 19 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)

Facility Wide Conditions

22. **Limitation** – Visible emissions from the facility shall not exceed 20 percent opacity as determined by 40 CFR 60, Appendix A, Method 9, except for one six-minute period in any one hour which shall not exceed 30 percent opacity.
(9 VAC 5-80-110 and Condition 6 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)

23. **Limitation** – Unless otherwise specified, fugitive dust emission controls shall include the following or equivalent as a minimum:

- a. Dust from grading, cell construction, waste compaction, application of daily cover, wood waste chipping operations, storage piles and traffic areas shall be controlled by wet suppression or equivalent (as approved by the DEQ) control measures.
- b. All material being stockpiled shall be kept moist to control dust during storage and handling, or covered to minimize emissions.
- c. Dust from haul roads shall be controlled by wet suppression and prompt removal of dried sediment resulting from soil erosion and dirt spilled or tracked onto paved surfaces within the landfill.
- d. Reasonable precautions shall be taken to prevent deposition of dirt on public roads and subsequent dust emissions. Dirt spilled or tracked onto paved surfaces shall be promptly removed to prevent particulate matter from becoming airborne.

(9 VAC 5-80-110 and Condition 3 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)

24. **Limitation** – In order to minimize the duration and frequency of excess emissions, the permittee shall implement the DEQ-approved Dust Control Plan which outlines the preventive measures to be implemented for dust control at the landfill. The plan shall include the following as a minimum:

- a. Identification of the personnel responsible for overseeing dust control.
- b. Description and the frequency of measures to be taken to prevent excess emissions from grading, cell construction, waste compaction and daily cover application.
- c. Description and the frequency of measures to be taken to prevent excess emissions from storage piles and stockpiling operations.
- d. Description and the frequency of measures to be taken to prevent dust from haul roads and other unpaved surfaces, and description and the frequency of measures to be taken to

prevent deposition of dirt on paved surfaces within the landfills and access roads entering the landfill.

(9 VAC 5-80-110 and Condition 4 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)

25. **Monitoring and Recordkeeping** – During each day of landfill operations, the permittee shall visually survey the trafficable roads at the site and landfill activities for any sources of excessive fugitive emissions. For the purpose of this survey, excessive emissions are considered to be any visible emissions that leave the facility site boundaries. The presence of excessive fugitive emissions shall require further investigation as to the cause of the emissions and timely corrective action shall be taken. If water is used to control the fugitive dust emissions, the permittee shall take care not to create a water quality problem from surface water runoff. All observations and corrective actions taken shall be logged and recorded.

(9 VAC 5-80-110 and Condition 11 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)

26. **Monitoring and Recordkeeping** – The permittee shall maintain records of all emission data and operating parameters necessary to demonstrate compliance with this permit. The content of and format of such records shall be arranged with the DEQ. These records shall include, but are not limited to:

- a. A copy of the DEQ-approved Dust Control Plan.
- b. Daily logs of the visual survey of the trafficable roads at the site and landfill activities to include the following:
 - i. The date, time, and name of the person performing each inspection;
 - ii. Whether or not excessive fugitive emissions are observed and the suspected cause of such emissions; and
 - iii. The date, time, and type of corrective actions taken.

These records shall be available for inspection by the DEQ and shall be current for the most recent five years. Off-site records may be maintained if they are retrievable within four hours. Either paper copy or electronic formats are acceptable.

(9 VAC 5-80-110 and Condition 12 of 04/23/2001 Permit, as amended 11/20/2006 and 12/29/2015)

27. **Testing** – If testing is conducted in addition to the monitoring specified in this permit, the permittee shall use the appropriate method(s) in accordance with procedures approved by the DEQ.

(9 VAC 5-80-110)

Insignificant Emission Units

28. **Insignificant Emission Units** – The following emission units at the facility are identified in the application as insignificant emission units under 9 VAC 5-80-720:

Emission Unit No.	Emission Unit Description	Citation	Pollutant(s) Emitted (9 VAC 5-80-720 B)	Rated Capacity (9 VAC 5-80-720 C)
IS-1	Leachate Storage Tank 500,000 gallons	9 VAC 5-80-720 B	VOC	-
IS-4	15 Solar Spark LFG Flares 90 scfm each	9 VAC 5-80-720 B	NO _x , CO, VOC, PM	-

These emission units are presumed to be in compliance with all requirements of the federal Clean Air Act as may apply. Based on this presumption, no monitoring, recordkeeping, or reporting shall be required for these emission units in accordance with 9 VAC 5-80-110. (9 VAC 5-80-110)

Permit Shield & Inapplicable Requirements

29. Permit Shield & Inapplicable Requirements – Compliance with the provisions of this permit shall be deemed compliance with all applicable requirements in effect as of the permit issuance date as identified in this permit. This permit shield covers only those applicable requirements covered by terms and conditions in this permit and the following requirements which have been specifically identified as being not applicable to this permitted facility:

Citation	Title of Citation	Description of Applicability
9 VAC 5 Chapter 40 Article 43	Emissions Standards for Municipal Solid Waste (MSW) Landfills (Rule 4-43)	Applies to MSW landfills constructed, reconstructed or modified before May 30, 1991. Battle Creek Landfill was modified (expanded) in September 2015, so it is not subject to Rule 4-43.
9 VAC 5 Chapter 40 Article 43.1	Emission Standards for Municipal Solid Waste Landfills for which Construction, Reconstruction, or Modification was Commenced On or Before July 17, 2014 (Rule 4-43.1)	Battle Creek Landfill's expansion started in September 2015; since the landfill was modified on or after July 17, 2014, it is not subject to Rule 4- 43.1.
40 CFR 63, Subpart AAAA	National Emission Standards for Hazardous Air Pollutants for Municipal Solid Waste Landfills	The facility will be subject to 40 CFR Part 63, Subpart AAAA - National Emission Standards for Hazardous Air Pollutants for Municipal Solid Waste (MSW) Landfills when the uncontrolled emissions of NMOC from the landfill exceeds 50 Mg/yr, as calculated according to 40 CFR 60.764(a) of the MSW landfills New Source Performance Standards in 40 CFR 60, Subpart XXX, and the facility is required to install a collection and control system.
40 CFR 64	Compliance Assurance Monitoring (CAM)	Pre-control potential emissions from the facility are less than 100 tons per year for all regulated pollutants, so CAM does not apply according to 40 CFR 64.2(a)(3).
40 CFR 98	Greenhouse Gas (GHG) Reporting	Requirements in the GHG Reporting Rule in 40 CFR Part 98 are currently not included in the definition of "applicable requirement" in 40 CFR 70.2 and 71.2.

Nothing in this permit shield shall alter the provisions of §303 of the federal Clean Air Act, including the authority of the administrator under that section, the liability of the owner for any violation of applicable requirements prior to or at the time of permit issuance, or the ability to obtain information by (i) the administrator pursuant to §114 of the federal Clean Air Act, (ii) the Board pursuant to §10.1-1314 or §10.1-1315 of the Virginia Air Pollution Control Law or (iii) the Department pursuant to §10.1-1307.3 of the Virginia Air Pollution Control Law.

(9 VAC 5-80-110 and 9 VAC 5-80-140)

General Conditions

30. **Federal Enforceability** – All terms and conditions in this permit are enforceable by the administrator and citizens under the federal Clean Air Act, except those that have been designated as only state-enforceable.
(9 VAC 5-80-110 N)

31. Permit Expiration

- a. This permit has a fixed term of five years. The expiration date shall be the date five years from the date of issuance. Unless the owner submits a timely and complete application for renewal to the Department consistent with the requirements of 9 VAC 5-80-80, the right of the facility to operate shall be terminated upon permit expiration.
- b. The owner shall submit an application for renewal at least six months but no earlier than eighteen months prior to the date of permit expiration.
- c. If an applicant submits a timely and complete application for an initial permit or renewal under 9 VAC 5-80-80 F, the failure of the source to have a permit or the operation of the source without a permit shall not be a violation of Article 1, Part II of 9 VAC 5 Chapter 80, until the Board takes final action on the application under 9 VAC 5-80-150.
- d. No source shall operate after the time that it is required to submit a timely and complete application under subsections C and D of 9 VAC 5-80-80 for a renewal permit, except in compliance with a permit issued under Article 1, Part II of 9 VAC 5 Chapter 80.
- e. If an applicant submits a timely and complete application under section 9 VAC 5-80-80 for a permit renewal but the Board fails to issue or deny the renewal permit before the end of the term of the previous permit, (i) the previous permit shall not expire until the renewal permit has been issued or denied and (ii) all the terms and conditions of the previous permit, including any permit shield granted pursuant to 9 VAC 5-80-140, shall remain in effect from the date the application is determined to be complete until the renewal permit is issued or denied.
- f. The protection under subsections F 1 and F 5 (ii) of section 9 VAC 5-80-80 F shall cease to apply if, subsequent to the completeness determination made pursuant to section 9 VAC 5-80-80 D, the applicant fails to submit by the deadline specified in writing by the Board any additional information identified as being needed to process the application.

(9 VAC 5-80-80 B, C and F, 9 VAC 5-80-110 D and 9 VAC 5-80-170 B)

32. **Recordkeeping and Reporting** – All records of monitoring information maintained to demonstrate compliance with the terms and conditions of this permit shall contain, where applicable, the following:

- a. The date, place as defined in the permit, and time of sampling or measurements;
- b. The date(s) analyses were performed;

- c. The company or entity that performed the analyses;
- d. The analytical techniques or methods used;
- e. The results of such analyses; and
- f. The operating conditions existing at the time of sampling or measurement.

(9 VAC 5-80-110 F)

33. **Recordkeeping and Reporting** – Records of all monitoring data and support information shall be retained for at least five years from the date of the monitoring sample, measurement, report, or application. Support information includes all calibration and maintenance records and all original strip-chart recordings for continuous monitoring instrumentation, and copies of all reports required by the permit.

(9 VAC 5-80-110 F)

34. **Recordkeeping and Reporting** – The permittee shall submit the results of monitoring contained in any applicable requirement to DEQ no later than **March 1** and **September 1** of each calendar year. This report must be signed by a responsible official, consistent with 9 VAC 5-80-80 G, and shall include:

- a. The time period included in the report. The time periods to be addressed are January 1 to June 30 and July 1 to December 31; and
- b. All deviations from permit requirements. For purpose of this permit, deviations include, but are not limited to:
 - i. Exceedance of emissions limitations or operational restrictions;
 - ii. Excursions from control device operating parameter requirements, as documented by continuous emission monitoring, periodic monitoring, or Compliance Assurance Monitoring (CAM) which indicates an exceedance of emission limitations or operational restrictions; or,
 - iii. Failure to meet monitoring, recordkeeping, or reporting requirements contained in this permit.
- c. If there were no deviations from permit conditions during the time period, the permittee shall include a statement in the report that “no deviations from permit requirements occurred during this semi-annual reporting period.”

(9 VAC 5-80-110 F)

35. **Annual Compliance Certification** – Exclusive of any reporting required to assure compliance with the terms and conditions of this permit or as part of a schedule of compliance contained in this permit, the permittee shall submit to EPA and DEQ no later than March 1 each calendar year a certification of compliance with all terms and conditions

of this permit including emission limitation standards or work practices for the period ending December 31. The compliance certification shall comply with such additional requirements that may be specified pursuant to §114(a)(3) and §504(b) of the federal Clean Air Act. The permittee shall maintain a copy of the certification for five (5) years after submittal of the certification. This certification shall be signed by a responsible official, consistent with 9 VAC 5-80-80 G, and shall include:

- a. The time period included in the certification. The time period to be addressed is January 1 to December 31.
- b. The identification of each term or condition of the permit that is the basis of the certification.
- c. The compliance status.
- d. Whether compliance was continuous or intermittent, and if not continuous, documentation of each incident of non-compliance.
- e. Consistent with subsection 9 VAC 5-80-110 E, the method or methods used for determining the compliance status of the source at the time of certification and over the reporting period.
- f. Such other facts as the permit may require to determine the compliance status of the source.

One copy of the annual compliance certification shall be submitted to EPA in electronic format only. The certification document should be sent to the following electronic mailing address: R3_APD_Permits@epa.gov

(9 VAC 5-80-110 K.5)

36. **Permit Deviation Reporting** – The permittee shall notify the DEQ within four daytime business hours, after discovery of any deviations from permit requirements which may cause excess emissions for more than one hour, including those attributable to upset conditions as may be defined in this permit. In addition, within 14 days of the discovery, the permittee shall provide a written statement explaining the problem, any corrective actions or preventative measures taken, and the estimated duration of the permit deviation. The occurrence should also be reported in the next semi-annual compliance monitoring report pursuant to General Condition 34 of this permit.

(9 VAC 5-80-110 F.2 and 9 VAC 5-80-250)

37. **Failure/Malfunction Reporting** – In the event that any affected facility or related air pollution control equipment fails or malfunctions in such a manner that may cause excess emissions for more than one hour, the owner shall, as soon as practicable but no later than four daytime business hours after the malfunction is discovered, notify the DEQ of such failure or malfunction and shall within 14 days of discovery provide a written statement giving all pertinent facts, including the estimated duration of the breakdown. Owners subject to the requirements of 9 VAC 5-40-50 C and 9 VAC 5-50-50 C are not required to provide

the written statement prescribed in this paragraph for facilities subject to the monitoring requirements of 9 VAC 5-40-40 and 9 VAC 5-50-40. When the condition causing the failure or malfunction has been corrected and the equipment is again in operation, the owner shall notify the DEQ.

(9 VAC 5-80-110 and 9 VAC 5-20-180 C)

38. **Severability** – The terms of this permit are severable. If any condition, requirement or portion of the permit is held invalid or inapplicable under any circumstance, such invalidity or inapplicability shall not affect or impair the remaining conditions, requirements, or portions of the permit.
(9 VAC 5-80-110 G.1)
39. **Duty to Comply** – The permittee shall comply with all terms and conditions of this permit. Any permit noncompliance constitutes a violation of the federal Clean Air Act or the Virginia Air Pollution Control Law or both and is grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or, for denial of a permit renewal application.
(9 VAC 5-80-110 G.2)
40. **Need to Halt or Reduce Activity not a Defense** – It shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit.
(9 VAC 5-80-110 G.3)
41. **Permit Modification** – A physical change in, or change in the method of operation of, this stationary source may be subject to permitting under State Regulations 9 VAC 5-80-50, 9 VAC 5-80-1100, 9 VAC 5-80-1605, or 9 VAC 5-80-2000 and may require a permit modification and/or revisions except as may be authorized in any approved alternative operating scenarios.
(9 VAC 5-80-110, 9 VAC 5-80-190 and 9 VAC 5-80-260)
42. **Property Rights** – The permit does not convey any property rights of any sort, or any exclusive privilege.
(9 VAC 5-80-110 G.5)
43. **Duty to Submit Information** – The permittee shall furnish to the Board, within a reasonable time, any information that the Board may request in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating the permit or to determine compliance with the permit. Upon request, the permittee shall also furnish to the Board copies of records required to be kept by the permit and, for information claimed to be confidential, the permittee shall furnish such records to the Board along with a claim of confidentiality.
(9 VAC 5-80-110 G.6)
44. **Duty to Submit Information** – Any document (including reports) required in a permit condition to be submitted to the Board shall contain a certification by a responsible official that meets the requirements of 9 VAC 5-80-80 G.
(9 VAC 5-80-110 K.1)

45. **Duty to Pay Permit Fees** – The owner of any source for which a permit under 9 VAC 5-80-50 through 9 VAC 5-80-300 was issued shall pay permit fees consistent with the requirements of 9 VAC 5-80-310 through 9 VAC 5-80-350 in addition to an annual permit maintenance fee consistent with the requirements of 9 VAC 5-80-2310 through 9 VAC 5-80-2350. The actual emissions covered by the permit program fees for the preceding year shall be calculated by the owner and submitted to the Department by **April 15** of each year. The calculations and final amount of emissions are subject to verification and final determination by the DEQ. The amount of the annual permit maintenance fee shall be the largest applicable base permit maintenance fee amount from Table 8-11A in 9 VAC 5-80-2340, adjusted annually by the change in the Consumer Price Index.
(9 VAC 5-80-110 H, 9 VAC 5-80-340 C and 9 VAC 5-80-2340)
46. **Fugitive Dust Emission Standards** – During the operation of a stationary source or any other building, structure, facility, or installation, no owner or other person shall cause or permit any materials or property to be handled, transported, stored, used, constructed, altered, repaired, or demolished without taking reasonable precautions to prevent particulate matter from becoming airborne. Such reasonable precautions may include, but are not limited to, the following:
- a. Use, where possible, of water or chemicals for control of dust in the demolition of existing buildings or structures, construction operations, the grading of roads, or the clearing of land;
 - b. Application of asphalt, water, or suitable chemicals on dirt roads, materials stockpiles, and other surfaces which may create airborne dust; the paving of roadways and the maintaining of them in a clean condition;
 - c. Installation and use of hoods, fans, and fabric filters to enclose and vent the handling of dusty material. Adequate containment methods shall be employed during sandblasting or other similar operations;
 - d. Open equipment for conveying or transporting material likely to create objectionable air pollution when airborne shall be covered or treated in an equally effective manner at all times when in motion; and,
 - e. The prompt removal of spilled or tracked dirt or other materials from paved streets and of dried sediments resulting from soil erosion.
- (9 VAC 5-80-110 and 9 VAC 5-50-90)
47. **Startup, Shutdown, and Malfunction** – At all times, including periods of startup, shutdown, soot blowing, and malfunction, owners shall, to the extent practicable, maintain and operate any affected facility including associated air pollution control equipment in a manner consistent with air pollution control practices for minimizing emissions. Determination of whether acceptable operating and maintenance procedures are being used will be based on information available to the Board, which may include, but is not limited to, monitoring results, opacity observations, review of operating and maintenance procedures, and inspection of the source.
(9 VAC 5-80-110 and 9 VAC 5-50-20 E)

48. **Alternative Operating Scenarios** – Contemporaneously with making a change between reasonably anticipated operating scenarios identified in this permit, the permittee shall record in a log at the permitted facility a record of the scenario under which it is operating. The permit shield described in 9 VAC 5-80-140 shall extend to all terms and conditions under each such operating scenario. The terms and conditions of each such alternative scenario shall meet all applicable requirements including the requirements of 9 VAC 5 Chapter 80, Article 1.
(9 VAC 5-80-110 J)

49. **Inspection and Entry Requirements** – The permittee shall allow DEQ, upon presentation of credentials and other documents as may be required by law, to perform the following:

- a. Enter upon the premises where the source is located or emissions-related activity is conducted, or where records must be kept under the terms and conditions of the permit.
- b. Have access to and copy, at reasonable times, any records that must be kept under the terms and conditions of the permit.
- c. Inspect at reasonable times any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under the permit.
- d. Sample or monitor at reasonable times substances or parameters for the purpose of assuring compliance with the permit or applicable requirements.

(9 VAC 5-80-110 K.2)

50. **Reopening For Cause** – The permit shall be reopened by the Board if additional federal requirements become applicable to a major source with a remaining permit term of three years or more. Such reopening shall be completed no later than 18 months after promulgation of the applicable requirement. No such reopening is required if the effective date of the requirement is later than the date on which the permit is due to expire, unless the original permit or any of its terms and conditions has been extended pursuant to 9 VAC 5-80-80 F. The conditions for reopening a permit are as follows:

- a. The permit shall be reopened if the Board or the administrator determines that the permit contains a material mistake or that inaccurate statements were made in establishing the emissions standards or other terms or conditions of the permit.
- b. The permit shall be reopened if the administrator or the Board determines that the permit must be revised or revoked to assure compliance with the applicable requirements.
- c. The permit shall not be reopened by the Board if additional applicable state requirements become applicable to a major source prior to the expiration date established under 9 VAC 5-80-110 D.

(9 VAC 5-80-110 L)

51. **Permit Availability** – Within five days after receipt of the issued permit, the permittee shall maintain the permit on the premises for which the permit has been issued and shall make the permit immediately available to DEQ upon request.
(9 VAC 5-80-110 and 9 VAC 5-80-150 E)

52. **Transfer of Permits**

- a. No person shall transfer a permit from one location to another, unless authorized under 9 VAC 5-80-130, or from one piece of equipment to another.
- b. In the case of a transfer of ownership of a stationary source, the new owner shall comply with any current permit issued to the previous owner. The new owner shall notify the Board of the change in ownership within 30 days of the transfer and shall comply with the requirements of 9 VAC 5-80-200.
- c. In the case of a name change of a stationary source, the owner shall comply with any current permit issued under the previous source name. The owner shall notify the Board of the change in source name within 30 days of the name change and shall comply with the requirements of 9 VAC 5-80-200.

(9 VAC 5-80-110 and 9 VAC 5-80-160)

53. **Permit Revocation or Termination for Cause** – A permit may be revoked or terminated prior to its expiration date if the owner knowingly makes material misstatements in the permit application or any amendments thereto or if the permittee violates, fails, neglects or refuses to comply with the terms or conditions of the permit, any applicable requirements, or the applicable provisions of 9 VAC 5 Chapter 80, Article 1. The Board may suspend, under such conditions and for such period of time as the Board may prescribe any permit for any of the grounds for revocation or termination or for any other violations of these regulations.
(9 VAC 5-80-110, 9 VAC 5-80-190 C and 9 VAC 5-80-260)

54. **Duty to Supplement or Correct Application** – Any applicant who fails to submit any relevant facts or who has submitted incorrect information in a permit application shall, upon becoming aware of such failure or incorrect submittal, promptly submit such supplementary facts or corrections. An applicant shall also provide additional information as necessary to address any requirements that become applicable to the source after the date a complete application was filed but prior to release of a draft permit.
(9 VAC 5-80-110 and 9 VAC 5-80-80 E)

55. **Stratospheric Ozone Protection** – If the permittee handles or emits one or more Class I or II substances subject to a standard promulgated under or established by Title VI (Stratospheric Ozone Protection) of the federal Clean Air Act, the permittee shall comply with all applicable sections of 40 CFR Part 82, Subparts A to F.
(9 VAC 5-80-110 and 40 CFR Part 82)

56. **Asbestos Requirements** – The permittee shall comply with the requirements of National Emissions Standards for Hazardous Air Pollutants (40 CFR 61) Subpart M, National Emission Standards for Asbestos as it applies to the following: Standards for Demolition and

Renovation (40 CFR 61.145), Standards for Insulating Materials (40 CFR 61.148), and Standards for Waste Disposal (40 CFR 61.150).
(9 VAC 5-60-70 and 9 VAC 5-80-110 A.1)

57. **Accidental Release Prevention** – If the permittee has more, or will have more than a threshold quantity of a regulated substance in a process, as determined by 40 CFR 68.115, the permittee shall comply with the requirements of 40 CFR Part 68.
(9 VAC 5-80-110 and 40 CFR Part 68)
58. **Changes to Permits for Emissions Trading** – No permit revision shall be required under any federally approved economic incentives, marketable permits, emissions trading and other similar programs or processes for changes that are provided for in this permit.
(9 VAC 5-80-110 I)
59. **Emissions Trading** – Where the trading of emissions increases and decreases within the permitted facility is to occur within the context of this permit and to the extent that the regulations provide for trading such increases and decreases without a case-by-case approval of each emissions trade:
- a. All terms and conditions required under 9 VAC 5-80-110, except subsection N, shall be included to determine compliance.
 - b. The permit shield described in 9 VAC 5-80-140 shall extend to all terms and conditions that allow such increases and decreases in emissions.
 - c. The owner shall meet all applicable requirements including the requirements of 9 VAC 5-80-50 through 9 VAC 5-80-300.
- (9 VAC 5-80-110 I)